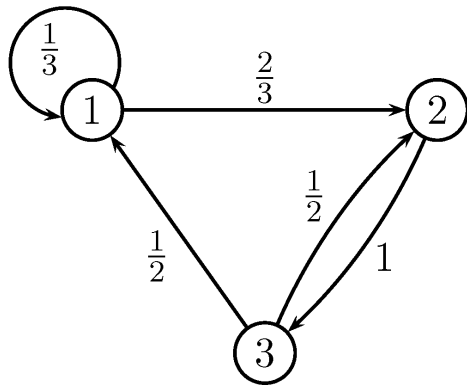
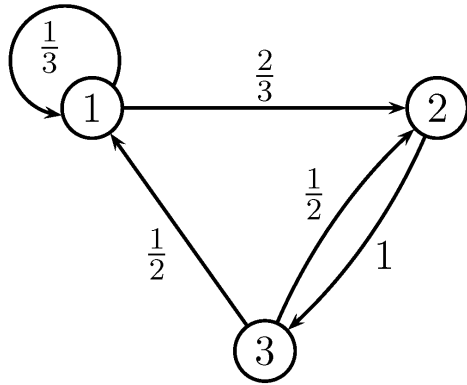


Markov Chains

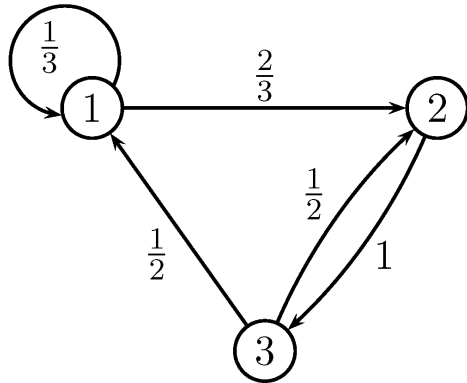


Markov Chains



	-	1	2	3
-	0	$\frac{1}{3}$	$\frac{1}{3}$	$\frac{1}{3}$
1	0	$\frac{1}{3}$	$\frac{2}{3}$	0
2	0	0	0	1
3	$\frac{1}{2}$	$\frac{1}{4}$	$\frac{1}{4}$	0

Markov Chains



$$P(3-1-1-2-3) =$$

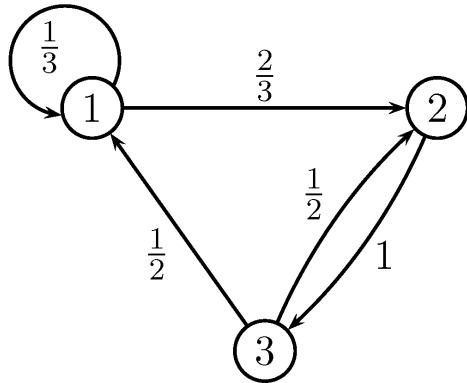
$$P(3|-) \cdot P(1|3) \cdot P(1|1) \cdot P(2|1) \cdot P(3|2) \cdot P(-|3) =$$

$$\frac{1}{3} \cdot \frac{1}{4} \cdot \frac{1}{3} \cdot \frac{2}{3} \cdot 1 \cdot \frac{1}{2} =$$

$$0,0093$$

	-	1	2	3
-	0	$\frac{1}{3}$	$\frac{1}{3}$	$\frac{1}{3}$
1	0	$\frac{1}{3}$	$\frac{2}{3}$	0
2	0	0	0	1
3	$\frac{1}{2}$	$\frac{1}{4}$	$\frac{1}{4}$	0

Markov Chains



$$P(2-3-2-1-2) =$$

$$P(2|-) \cdot P(3|2) \cdot P(2|3) \cdot P(1|2) \cdot P(2|1) \cdot P(-|2) =$$

$$\frac{1}{3} \cdot 1 \cdot \frac{1}{4} \cdot 0 \cdot \frac{2}{3} \cdot 0 =$$

$$0$$

	-	1	2	3
-	0	$\frac{1}{3}$	$\frac{1}{3}$	$\frac{1}{3}$
1	0	$\frac{1}{3}$	$\frac{2}{3}$	0
2	0	0	0	1
3	$\frac{1}{2}$	$\frac{1}{4}$	$\frac{1}{4}$	0